SCAN

The Suncoast Apple Tree

Newsletter

April--1989

INSIDE:

Letter from the new editor
How to build your own Hard-Drive
Programming in Appleworks
Special offer from Roger Wagner Publishing
Jim's Views
Help Line (yes, it's back!)
Upcoming Events:

Don't forget, Applefest in Boston May 5th through 7th

Next Meeting, April 3rd, Louis Coeyman will demonstrate the dissasembly of an Apple II+, for those who are interested in the insides of their computers, and will do the same for a disk drive.

SUNCOAST APPLE TREE
COMPUTER USERS GROUP

WHAT: SCAT Monthly meetings

WHEN: First Tuesday of each month at 6:30 pm

WHO: Loren S. Damewood
President 345-2682

Dr. Donald Macrae
Vice Pres. 733-1161

Elsie Cichanski
Secretary 446-8772

Tom Rasmussen
Treasurer 784-9587

John O. Demuth
Librarian 734-8673

Loren S. Damewood
SCAN Editor 345-2682

WHERE: Clearwater Library East
2251 Drew Street
462-6400

Drew Street. 1 mile west of US 19, just east of Belcher Road

SCAT is a non-profit interest group for the education and enlightenment of Apple and compatible computer users.

SCAN is published 12 times a year and is a benefit of membership. No warranty or representation is made as to the accuracy of any material contained herein.

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Half page - 18
Quarter - 10

From the Editor

Well it appears that I am the SCAN editor at the moment. This was clearly a possibility from the start, as the previous occupant of this chair was not happy with the response to his pleas for help. I'm not sure how long I'll be doing it, but while I am I'll try to do a good job. As for help, any and all submitted documents will be accepted gratefully, perused, and used at my discretion. Reviews of software, letters to the editor (brickbats included), news of upcoming events, bug reports, whatever strikes you as worthy of inclusion, send it along and I'll look it over. As for format, rather than try to make everyone print things the same way, I would prefer a textfile or a wordprocessing file from a Prodos, GS/OS, or DOS 3.3 program, on a disk, either 5.25 or 3.5. If it's a juicy tidbit from some other publication, please be wary of copyright law and make sure they don't mind. I need to know just where such things originate, so as to prepare my legal defense (grin). If you have something to send, have a modem, and can synchronize times with me, it will be easy enough to send text over the telephone, but get in touch with me first by voice. Speaking of which, I have strange hours, so best results can be obtained by observing the following:

Work - - - 3:30 til Midnite (813) 539-2040
Computer - from noon til 2:30 PM (813) 347-5104
Home - - - I'm seldom there, leave a message (813) 345-2682

I don't mind being called at work, but you must realize that I may have to call you back as time permits, rather than sit down and rap for a while.

I'd like to thank Louis Coeyman, Jim Blech, John Demuth, and Tom Rasmussen for their assistance producing this publication, and for their contributions. You will find Jim's Views a few pages in, and

This document was formatted with Appleworks GS, with only a few crashes, and printed out with an Imagewriter II

here is a column of bits and pieces from Louis Coeyman:

Notes on my recent trip to Reno, Carson City & Virginia City NV. Visits to several computer stores indicated a great lack of support for any user group.

Only one chain "Computer Base" knew of any user group. The store in Reno is the only one that had supported any users group with public domain software on bulletin-board for the Mac, but they dropped this service when several computer virus invaded their system.

The "Computercraft" of Reno expressed interest in starting a user group, bulletin-board, and public domain library but had never attended the local users club meetings.
(Special thanks to Bill Thompson for taking the time and for the information on First Class Peripherals.)

Two stores no longer support Apple products. Reno's Computerland cites local discount (K-Mart) and disinterest in supporting 8 bit software.

The one question I'm always asked is "How does your user group survive for so long?"
"The interest and support generated by the membership, computer stores, Apple computer support, helping members and nonmembers". In general as long as two people are seeking knowledge an willing to share there knowledge any club will survive.

** "Please support your computer stores." **
If your problems are greeted with 'we don't know, did you buy it from us?', 'this product is outdated', 'sorry we can't help you', or any other such response, please report it to us; the name of the sales person, the store, the product and the question you asked...

Q: Why is Appleworks GS so slow ?
A: It prints as a graphics dump, instead of using the character sets that are built into the printer firmware. You can print in 'draft mode' but that defeats the purpose of using the WYSIWYG interface. (that's What You See is What You Get, a common descriptor for such programs; doesn't say <u>when</u> you'll get it, you notice)

Q: With a IIc+, can I run DOS 3.3 Programs ?
A: Yes several programs are available that modify DOS 3.3 and allow file transfer to 3 1/2" disks. Then just boot the new disk on your IIc+. This won't work for copy-protected software, sorry.

Q: Using DOS what is *,I,A,B,T, ?
A: 1: the "*" is the symbol for a locked file. You can read or get information from it but can't write or add to it.
2: The "I" is the symbol for an Integer file. Integer is a language (Basic) with no decimal point to its numeric functions
3: The "A" is the symbol for an Applesoft file. Applesoft is a language (basic) that uses decimal point in its numeric functions.
4: The "B" is the symbol for an binary file. Binary files are o's and 1's or machine language files.
5: The "T" is the symbol for text file. Text files are ASCII (all the letters and numbers on the keyboard) preffered file-type to transfer information by modem.

Q: What is DOS?
A: DOS or "disk operating system." A program that operates the disk drives.....
1: Dos 3.3 is disk operating system version 3.3 By Apple computer.....
2: ProDOS is a newer disk operating system from Apple computer ,the version number is present on boot-up.... 3: Other DOS Pascal,CPM,SOS.....

GS battery:
Your GS has a lithium battery with a life span of about 5 years. It supplies standby power to your internal clock and some ram for control panel use. If your clock and control panel settings disappear then suspect this battery. Your Apple dealer will replace it for you.

GS no buffers:
Trying to run a "basic" program and get " no buffers available". Use proDOS and exit to basic. Then run your program.

Applied engineering
The address you have requested:
Applied engineering
P.O.Box 5100
Carrollton,tx. 75011
(214) 241-6060

Second drive boot on a IIc or Laser 128:
To boot a disk in an external drive, simply press "P" just after turn on or reboot. That action selects the control panel where you can set the boot slot. 6 For external 5 1/4 or 7 for internal 3 1/2. *Not tested*

Transfer Mac graphics to your GS:
Shrconvert version 2.1 By Jason Harper is shareware available on most major bulletin-boards. (and in our shareware collection)

-I am requesting any information on:
Printer codes, interface cards, switch settings, cable pinouts, for all printers , interface cards and modems

Having trouble with any program or equipment?? Then use your help line. Others may have the same question so also notify the news letter editor.

BUILDING YOUR OWN SCSI HARD DRIVE

By
Rick Hannon

When I first gave serious thought to building my own hard drive I must admit I had some doubts. Let me rephrase that, many doubts. Letting you in on my experience you will find that its not that difficult and more cost effective than buying an assembled drive.

My biggest fear was laying out $750 only to end up with a bunch of used computer parts. This fear stayed with me until the first time I booted up my machine with the hard drive. I was also afraid that during the assembly I would cross a wire or somehow damage the drive leaving me with a repair bill before I even start. As you will soon see, assembly is very easy and can be finished in under an hour.

The hard drive assembly I used was a Seagate ST277N which is a 60 megabyte SCSI (Small Computer System Interface) drive. The drive was ordered from Hard Drives International. The external drive case was from Tulin Corp. and included internal cabling and cooling fan. The external cable and power cord were additional and were bought from Tulin also. The Apple SCSI interface was bought from a local Apple dealer. Other drives and cases are available from many sources. Just browse through any issue of "Computer Shopper" to find what is available.

Both orders were placed on a Tuesday afternoon and arrived exactly seven days later. The hard disk was very well packed with two-inch thick foam rubber surrounding the drive. The drive is in a sealed plastic bag and placed inside a smaller box. The external case was wrapped in bubble wrap and placed in a box full of styrofoam peanuts.

You are bound to be excited to get started but please wait. Ideally you should let your hard drive assembly stay sealed in its plastic wrap for 24 hours to climatize to the environment it will be used in. If you really can't wait that long at least study the manuals included and take a good look at the external case and parts involved. That should take 8 to 12 hours... Right!

While we wait for the drive to climatize, lets take a look at the external drive case from Tulin Corp. The case is all metal construction measuring 4 1/4" high, 9 3/4" wide, and 10" deep. The finish is baked enamel in the Apple platinum color. Two drives could easily be installed with just a different internal cable and mounting bracket. The Seagate ST277N needs a 13 watt power supply so the installed power supply is large enough for two drives. Very nicely done construction; however, the power switch is "cheap" and I would prefer a toggle switch similar to the one on the back of my computer.

Now that we have read the instruction manuals included and the drive has climatized, lets begin by taking the following precautions:

- **DO NOT unwrap the drive until you are ready to install it in the system.**
- **Always handle the drive by the frame or casting.**
- **Do not touch the board components or connectors without taking static-discharge precautions.**

DISK DRIVE ASSEMBLY

1. Remove the three flat head screws from the front panel. Pull the front panel off the case being cautious not to pull any wires that might be connected to the green LED on the panel. If the wires are not already disconnected, do so now.

2. Remove the black plastic switch extender (located on the right over the power switch).

3. Slide the base plate assembly out though the BACK of the case. (You might have to turn the base plate slightly to

get past the screw on the inner right side.)

4. The assembly instructions from Tulin showed how to wire the LED to show disk access but with my ST277N I could not do so because the drive didn't have a wire connecting to the LED on the disk drive. Even if the drive had the wire, some soldering would be necessary. Very few should be brave enough to try this. Instead, mine shows power on only.

5. Open the wrapping from the drive assembly and carefully remove. Remove the front black bezel from the drive by removing the two brass screws holding it in place.

6. Locate the SCSI address jumpers on the drive assembly and remove the jumper connected to pins. Attach the small ribbon cable to the address jumpers. The red stripe on the cable should be on your right when looking at the drive from the rear. Do not use pressure.

7. Attach the 50-pin SCSI cable to the drive, again the red stripe should be on the right when looking at the drive from the rear. Be sure it is locked on tight.

8. Carefully place the hard disk onto the base assembly and attach it with the four supplied screws. If you have trouble aligning the drives assembly's holes to the base plate, loosen the power supply's mounting screws to provide some slack. Plug either one of the cables from the power supply to the hard drive's circuit board.

9. Install the base plate/drive assembly into the case. Attach the two thin wires (one colored, one black) from the power supply to the LED on the front panel of the drive.

10. Attach the power cord to the rear of the case and turn on the front panel power switch by sliding it to the right.

WARNING - DO NOT TOUCH ANY COMPONENTS WHILE THE DRIVE IS PLUGGED IN!!! If the LED does not glow, turn off the power and reverse the wires on the LED.

11. Re-attach the front panel assembly, being sure to mount the black plastic switch extender properly on the switch. Tighten the three screws until the back plate is in line with the rear edge of the cover. Make sure the switch extender moves freely.

- **The decal to cover the screws cannot be removed without damaging it. Do not affix until the drive has been formatted and fully tested.**

12. Open the top of your computer and install the Apple SCSI Card (should be Revision C EPROM). Any questions should be answered by reading the manual supplied with the Apple SCSI Card.

13. Attach the DB-25 end of the external cable to the connector on the computer and the other end to EITHER connector on the rear of the drive case.

Now its fully assembled. That wasn't bad now was it. Now the really time consuming part to the whole process. Formatting and testing the drive. To do my formatting and testing I used two "freeware" programs written by Joe Jaworski. The programs are called "SCSI Hacker" and "DiskTimer GS." These programs are available on AppleLink, Compuserve, and GEnie. The programs come with very good documentation, so I will only briefly cover them. My instructions assume you have an Apple IIgs using GS/OS and the Apple SCSI Card with Revision C EPROM.

FORMATTING AND TESTING

- **Place the SCSI driver from the System Tools disk into your /SYSTEM/DRIVERS folder on your System Disk.**

1. Boot up "SCSI Hacker" from your floppy drive.

2. Choose "Low level format" from the main menu. Choose an interleave of five. Be patient, this might take a while.

3. Quit "SCSI Hacker" and now boot up "HDSCPartition" from your "Apple SCSI Card Utilities Disk." It doesn't matter how you set the partitions, as long as you set one for at least 10 megabytes in size.

4. Now format your hard drive with your favorite utility (Finder, Copy II Plus, Cat Doctor, System Utilities). This should only take a few seconds.

5. Put a copy of "DiskTimer GS" on the new volume and launch it from there. Wait until the tests have finished and write the results down. Example:

Read = 93 Seek = 77 Adapter Speed = 51

6. Repeat the process again but this time use an interleave of 10 (0A). Write down the test results of using the 10:1 interleave. Continue to increase the interleave by five until you reach 20:1.

7. Compare the results of the read factor. For my drive the best interleave was between 10:1 and 15:1. Example:

Interleave: 5(05) 10(0A) 15(0F)

Read Timing: 93 61 67

8. Now to pinpoint the best interleave I must begin the format/testing process increasing the interleave factor by one each time. To make a long story a little shorter the best interleave factor was 10:1. You would think your finished formatting now wouldn't you. The rule of thumb is to increase the interleave by two to achieve the best real-life performance. In my case a low-level format of 12:1 is the best to use. This gives me a "benchmark" reading of:

Read = 63 Seek= 90 Adapter Speed = 51

All finished! Very easy to do but just a little time consuming to get everything just right. Now we're ready to install and configure software onto the hard drive itself. Take your time! Backup your hard drive. Set-up subdirectories (folders) to organize all your files. Backup your hard drive. If you partition your drive its a good idea to put applications on one and data on the other. Backup your hard drive. It took every free minute of four days to get all my files onto the drive, so be patient, and backup your hard drive.

PROSEL

Those of you who haven't already, let me suggest you fork out $40 to get ProSel by Glen Bredon. It gets its name from the PROgram SELector that comes with the package but the utilities included are more than worth the forty dollars. You will wonder how you ever got along without it. Utilities include a file handler, disk repair, disk zapper, file de-fragmenter, file finder, fast disk copier, disk backup/restore and more. For those who have an Apple IIgs, get ProSel 16! Available February 1, 1989 for just $60.

You cannot get ProSel or ProSel 16 from your local retailer. Only from Dr. Bredon himself. Send your check to:

Glen Bredon
521 State Rd.
Princeton, NJ 08540

Here's a handy order form for Prosel. I can't recommend it too highly, for all Apple //'s, but especially for the GS. Editor

To : Glen Bredon
521 State Rd.
Princeton, NJ 08540

Please send me the following software package(s) :

Prosel	$40	( )
update	$5	( )
Prosel-16 (IIGS only)	$60	( )
upgrade	$20	( )
update	$10	( )
ProCmd	$25	( )
Dos.Master	$25	( )

Total enclosed ( )

Disk size preferred is: 5.25 ( ) 3.5 ( )

Name _____
Address _____
City, State, Zip _____
Telephone _ _ (___) - ___ - _____

COST BREAKDOWN

Seagate ST277N	$449.00
Tulin Corp. Case w 30w power supply and internal cabling	$119.00
Power cable	$ 4.00
External cable	$ 25.00
Apple SCSI Card w Revision C	$129.00
	$726.00

Shipping/handling, sales tax, and possible COD or credit card surcharges not included.

SEAGATE SCSI DRIVE SPECIFICATIONS

	ST225N	ST251N	ST277N
Formatted Capacity	21.4	42.8	64.9
Number of Disks	2	3	3
Number of Heads	4	6	6
Avg. Access Time(ms)	65	40	40
Avg. Power Consumption	16.8	13	13
Auto Head Park @ Power Down	NO	YES	YES
Ballpark Price	$299	$395	$449

All three use sputtered, thin film media and should operate at temperatures of 50 to 113 degrees.

Bulletin!

How would you like to help the Suncoast Apple Tree acquire a Sider D2 free of charge?

How do we do that? If we can assure First Class Peripherals that we can muster at least 100 people for a presentation, they will send a representative to speak to us, and that representative will bring along a FREE Sider D2 to give to the club. Not bad . . . let's be thinking about this, it's too good a deal to pass up casually. Are there enough of you out there to help us out? Let me tell you something: at last count, we have more people whose memberships have lapsed recently than active members. This is not good, and I'd like to turn it around. The club has a lot to offer its members, but the relationship is reciprocal, the club can't operate in a vacuum. Come to the meetings, pay your dues, send nasty-grams to the newsletter editor, even, but participate! I'd like to be able to take advantage of this offer from FCP in order to set up a small bulletin board for the use of the members. Having our own board will make it possible for the software library to be accessible online to those of us with modems, and it will provide an easy way to teach newcomers to the telecommunications field how easy it can be.

Hard Drives International
1208 E. Broadway Rd. 110
Tempe, AZ 85282
Orders: (800) 234-DISK
(602) 784-1038
Customer Service: (800) 541-8387
Order Status: (800) 541-8387
Telex: 405765
Fax: (602) 829-9193
(Hard drives)

Tulin Corp.
2393 Qume Drive
San Jose, CA 95131
(408) 432-9025
Telex: 499-4365
Fax: (408) 943-0782
(External cases, cables, & complete hard drive kits)

IB Computers
1519 S.W. Marlow
Portland, OR 97225
(503) 297-8425
(External cases)

Lyco Computer
(800) 233-8760
(Hard drives)

jb Technologies, Inc.
21011 Itasca St. F
Chatsworth, CA 91311
(818) 709-6400
Telex: 678953
Fax: (818) 341-2935
(Hard drives)

ComputAbility
P.O. Box 17882
Milwaukee, WI 53217
(800) 558-0003
Fax: (414) 357-7814
(Hard drives)

CTI Continental Trading, Inc.
(800) 284-8494
(Hard drives)

I don't claim to be an expert but I'm always willing to help others who wish to try assembling their own hard drive. You may reach me through the following information services.

AppleLink: RHannon
GEnie: R.HANNON
Compuserve: 75530,3130

********** GAMES GAMES GAMES **********

ARKANOID (for the GS)

For those who like arcade games, the best one that has come out in a while is Arkanoid, from TAITO. It is based on the regular old 'brick-out' concept, but with some twists that make it interesting. Some of the bricks release capsules that, when you capture them on the paddle, alter the playing characteristics of the ball, or give you other advantages. One, for instance, makes the paddle into a laser; this can speed up play considerably, and is invaluable when the little beasties start coming in and getting in the way of that ball! The graphics and sound are superior, it is hard-disk installable, (with key-disk copy protection) and I don't believe it requires more than 512K to run. It comes on a 3.5" disk. I will be putting a COA into the club library that will permit you to access any level, along with a few other functions.

WAR IN MIDDLE EARTH (for the GS)

This is a war game from Melbourne House, based on the Tolkien trilogy, Lord of the Rings, and it also has excellent graphics and sound. It is one of the programs that disables interrupts, so you will not be able to access the control panel while it is in operation. This program takes full advantage of the capabilities of the GS to display large documents through a window. You can scroll smoothly through the map of Middle Earth or focus down on small areas on it for character interaction. For those of you who have read the books will be at an advantage, as it follows them closely. Comes on two 3.5" disks, and requires a minimum of 768K.

HEART OF THE MAELSTROM (all Apple //'s)

This is the fifth Scenario in the Wizardry series, and it upholds their fine tradition. Characters may be brought forward from any of the other Wizardry character rosters, and they will feel right at home. The use of pop-up menus and hi-res graphics is good, though disk intensive. (It tends to access the drives a lot, and you have to be careful not to change disks at the wrong times) It comes on five, double-sided, 5.25" disks; is not copy protected, but requires you to look up key-words from a list printed in dark blue on dark maroon paper. My first copy of the game didn't work properly, but Sir Tech replaced the defective disks free of charge, and I got started. This game is very complex, you have to live up to certain standards or your characters will be corrupted (morally, that is). Apparently it is not nice to attack certain groups, and doing so alters the disposition of your characters to an Evil alignment. Guess I'll have to refore . . .

Loren Donewood

PROGRAMMING WITH APPLEWORKS

There are always programs and routines in Apple magazines which we are encouraged to type in and use. Have you ever tried to do this for a lengthy set of codes? It becomes very frustrating when errors of typing set in and whole lines must be done over. Wouldn't it be nice to be able to enter line numbers then be able to correct those lines if errors pop up? Of course there are programs which allow one to do this, and Global Program Line Editor comes to my mind as one means of doing this.

But, according to an article in APPLE ACCESS by Professor Desert Rat, we already have a method of doing this in our collections, this being the word processor of Appleworks. Appleworks has a program editor? Well, it's not called that but you sure can use it as such. Here's how.

Create a new Word Professor file, then type in your code, using line numbers and everything. You immediately gain the powerful features of Appleworks, including the ability to OA (F)ind a given word or number, or OA (R)eplace option. OK, having typed in the program, you now have the ability to go back over the code making any and all corrections just as you would with a letter or document.

Assuming you are now completely pleased with the appearance of the codes, OA-(P)rint this file as a TEXT (ASCII) File onto a previously formatted disk. Assuming you format your disk as "SAMPLE" and your program as "PROGRAM", then (P)rint as a text file: /SAMPLE/PROGRAM. This will print out your hard working program in text file format on the "SAMPLE" disk. You can now exit Appleworks and go into BASIC mode by any number of means. If you wanted to be fancy, you could have formatted your disk "SAMPLE" and added Prodos files "Prodos" and "Basic.System" and "Startup." This would have made your new disk self-starting. In either case, you may now EXEC your file PROGRAM by EXEC/SAMPLE/PROGRAM.

What you will now see will be a bunch of the Basic] prompts and finally a stationary flashing] cursor. At this point type in SAVE/SAMPLE/PROGRAM. This has saved your hard working basic program just as if you had typed it in from the keyboard and had SAVED it in basic.

Congratulations! You have made use of a program editor with your old familiar word processor and it has come out perfectly. This may seem a long way around, but the features previously outlined will make it all seem worthwhile as you enjoy the fruits of your labor.

Reprinted from BITS & BYTES, January, 1989, A.C.E.S.

Special Interest Groups

Speaking of programming, I'd like to hear from anyone who is interested in forming a special interest group devoted to the subject. Applesoft Basic, the language that comes on the system master disk and that everyone has, would be one area of concern, and Assembly language could also be interesting. I have done just a little of each, not enough to brag about, but perhaps there are others among us who would like to get to gether to discuss programming, languages, whatever. Get in touch with me at 539-2040 during weekday evenings.

Loren Damewood

Deals!

Here's a special offer from:

Roger Wagner Publishing, Inc.
1050 Pioneer Way, Suite 'P'
El Cajon, California 92020

Telephone: (619) 442-0522

I use SoftSwitch and MacroMate all the time, and I recommend Rogers' products highly, based on my experience with those two, and with Merlin 16. I looked at some magazine ads, and you can get some deals as good as this one, but mostly they are about the same as the deep discounts that the mail order places will give you. I consider it an advantage to buy directly from the publisher, as there is no question of whether the version you have is the latest one.

Loren

From: Roger Wagner
Subj: User Group Discount

Loren,

Here's a list of prices that any of your members can use to order RWP software:

Item	Reg. Price	Group Price
Assembly Lines: The Book	$19.95	$14.95
Assembly Lines: The Disk	$15.95	$ 9.95
Toolbox Series	$39.95 each	
Any 1	$39.95	$29.95
Any 2	$79.90	$54.90
Any 3	$119.95	$79.95
All 4	$159.80	$99.80

(Plus, with an order of 3 or 4, you get a free Toolbox Bonus disk.)

Titles in Toolbox Series:

Wizard's Toolbox, Chart 'n Graph Toolbox, Video Toolbox, Database Toolbox

MacroMate	$49.95	$35.00
SoftSwitch	$59.95	$45.00
MouseWrite	$149.95	$89.95
Write Choice	$64.95	$44.95
Merlin 8/16	$124.95	$85.00
update price(*)		$60.00

(*) Merlin Pro, APW, ORCA, or S-C assembler update price.

Printographer	$39.95	$29.95
P8CDA	$29.95	$19.95
Graphic Exchange	$49.95	$35.00

Thanks for your support, and the interest of your group!
By the way, those wishing to take advantage of this offer should do so before June 1, 1989. Just mention that you are a member of SunCoast AppleTree when you order.

Roger Wagner

First Class Peripherals

Another interesting deal has come up, one that will need looking into. First Class Peripherals has what they call The Wizard Program. In this program a local individual provides service and support to SIDEA owners. This can save a lot of money and time, as you won't have to send your hard-disk in, in many cases, and the prices can be considerably lower for services. The local Wizard can't open a drive that is in warranty, but in many cases that wouldn't be necessary. I know that there must be someone in the club who is interested in taking this on, and I'd like to hear from you. I'd like to do it myself, but I don't have the time.

APPLE IIC PLUS

Copyright 1988, Apple Computer, Inc.

The Apple IIc Plus CPU has a built-in accelerator that increases speed from 1 megahertz to 4 megahertz, an internal power supply, and an internal 3.5 inch disk drive. It is a compact, lightweight computer that is versatile, easy to use, and compatible with a large number of software programs.

The Apple IIc Puls replaces the Apple IIc and offers these additional enhancements:

The Apple IIc Plus can run most programs four times faster than the Apple IIc. And, if a program is running too fast, the accelerator can be turned off so that the computer operates at 1 MHz (the operating speed of earlier models of the Apple II).

The Apple IIc Plus includes an internal, 3.5" 800K floppy disk drive with a push button for motorized disk ejection. It has a disk storage capacity of over five times that of previous Apple IIc models (approximately 400 pages) and increased speed when maneuvering thr;ough applications. The Apple 3.5 drive, Apple 5.25 drive or the UniDisk 3.5 drive, or a combination of external drives can be configured with the Apple IIc Plus.

The Apple IIc Plus has an interna power supply which is self-contained making it highly transportable. Its handle makes the Apple IIc Plus easy to transport and locks in a downward position, providing a stable inclined keyboard for greater convenience.

The Apple IIc Plus uses the same Apple System peripheral-8 cables for connecting peripherals to built-in serial ports. Existing software applications work with the new computer and take full advantage of its new features

WHY A RAM DISK

By Will Janoff

Sooner or later you will find yourself staring at your computer's display, waiting for the light on your disk drive to turn off. That's the signal that it's time to consider upgrading your system with a RAMdisk. If you make heavy se of a program that seems to take forever to load, or searches through a large database. you should seriously start thinking of exploring a RAMdisk. A RAMdisk (also called electronic-disk, c-drive, pseudo-drive, virtual drive or hyperdrive) is a portion of random access memory that emulates a disk drive through the use of software. The software sets aside a portion of your computer's RAM and, as far as the computer is concerned, the reserved area is a disk drive and the amount of free RAM is that much less. Most RAMdisk software is supplied with the purchase of a memory expansion board. Copy II+ by Central Point Software is an excellent software program to use for that purpose, although it is possible to write your own.

RAMdisk software can assign whatever volume of memory you desire from the computer's entire RAM capacity down to whatever size you ask. However, while it is theoretically possible to reserve as large or small an area as memory allows, most programs limit the maximum to the floppy's volume (140K for 5.25 disks and 800K for 3.5 disks).

For example, if your system has 128K of RAM, you can assign any portion of that memory as a RAMdisk. Of course, some of the memory must be eft free for the program to use as a work area or else the program won't run. If a disk size of 64K is assigned, the RAMdisk will be located at those memory locations above the 64K mark, leaving the bottom 64K as free RAM.

Once an electronic disk is created, it is possible to copy program files or data files to it and run the programs as you would normally.

RAMdisks have certain advantages over an actual drive. For one thing, accessing programs and files is speedier ...usually from five to ten times faster. Reformatting a paragraph with a word processor occurs almost as soon as you enter the command. The increase in speed is due to the fact that the information, once loaded into the electronic disk, is actually located in RAM. Therefore, there is no disk drive head to be positioned, no I/O to be performed, and no data to be loaded or saved.

Another advantage is that some RAMdisk software allows you to assign as an electronic disk only that portion of memory that is needed. Finally, there is no floppy disk to accidentally bend, staple, fold or on which to spill coffee.

On the negative side, the application software must be capable of using the RAMdisk. Unfortunately, not all commercial software packages do so. Many are copy-protected and cannot be loaded from an electronic disk. Others require that certain files be located in a particular drive. In the former case, you cannot use the RAMdisk to hold the program, but you should be able to use it for the data files.

The biggest disadvantage of a RAMdisk is its volatility. When the computer is shut down or even during a brief power failure, the information is lost. Therefore, computing with a RAMdisk requires incorporating an additional step into your routine...saving the data from the electronic disk to a floppy or hard disk drive.

HELPLINE

The SCRT HELPLINE is a free consultation service for SCRT members only. Be prepared to give your club membership number when you call. Assistance is for owners of original software who have a manual. Please appreciate and respect our unpaid volunteers' time. (new helpers always welcome)

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WHO TO CALL WHEN YOU DON'T KNOW WHO TO CALL:
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LOREN DAMEWOOD.....345-2682
LOUIS COEYMAN.....347-8000
BILL ANDERSON.....791-4371
CHUCK QUENZLER.....796-6900*
DENNIS SWAINSTON.....733-2206
MIKE WRIGHT.....821-1792

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WHO TO CALL FOR GENERAL HELP ON SPECIFIC TOPICS:
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CURTIS GRAY.....595-5551
MIKE WRIGHT.....821-1792

***** EDUCATIONAL SOFTWARE *****
LYNN KLEIN.....391-1504
ED WARTICKI.....796-9665

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***** GRAPHICS *****
TONY CAPINEGRO.....596-0886
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DENISE ROHDE.....541-2107
:VISICALC
TED HARRIS.....797-1367
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CHECKBOOK/HOME FINANCE PROGRAMS
:DOLLARS & SENSE
JIM BLECH.....822-8537
SUE HEYMAN.....725-5344
:TIME IS MONEY
BILL DECOT.....784-4317

*** COOKING:MICRO COOKBOOK *****
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*******COPYING:COPY II+:*********
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:PFS
TERRY SHAW.....535-4185
:QUICKFILE IIE
DENISE ROHDE.....541-2107
:DBMASTER VERSION 5
LOREN DAMEWOOD.....345-2682

GRAPHICS:FANTAVISION/PRINT SHOP
BOB GIBSON.....733-9167
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INTEGRATED SOFTWARE: APPLEWORKS
BILL DECOT.....784-4317
PETE FIFER.....461-4130
TERRY SHAW.....535-4185
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** TELECOMMUNICATIONS/MODEMS **
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LOREN DAMEWOOD.....345-2682

**** WORD PROCESSING PROGRAMS ***
:APPLEWRITER II/IIE
CURTIS GRAY.....595-5[illegible]
SUE HEYMAN.....725-53[illegible]
ED WARTICKI.....796-9665
:MAGIC WINDOW
EARL GREENE.....527-4912
CHUCK QUENZLER.....796-6900*
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* PLEASE CALL CHUCK QUENZLER NOON TO 10:PM ONLY

14475

JIM'S VIEWS-APR 1989

Including the BEGINNERS' BASIC COURSE, and other tidbits which may cross my mind.
FEATURING
THE NEW APPLEWORKS GS

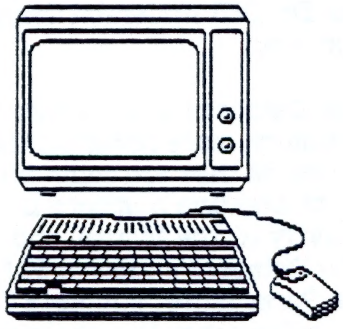
ABOUT APPLEWORKS GS

Because the Beginners' Course this month is going to be conducted by Lew Coyeman, I will not be submitting a lesson plan. Lew will be taking us inside an Apple to explain what all those slots and chips do in there. He will also cover the disk drive. So much for that I have agreed to write an article on the new APPLEWORKS GS. So here goes.

The new and much heralded APPLEWORKS GS is here. I got mine around Christmas time. This program is not for everybody. First of all, you have to have a GS to run it, but more than that you need a minimum of 1.25MB of memory and two 3-1/2" disk drives or a hard drive. You can run the program with one disk drive but you will be spending most of your time swapping disks. The package comes with three, completely filled, 3-1/2" disks, two for the program and one utility disk.

I installed the program on my hard drive. The installation was very easy, because the documentation was very clear. However, because of the size of the program and the fact that I only have a 5MB Profile hard drive, I had to remove a number of files (mostly old programs), to make room.

APPLEWORKS GS is not an AppleWorks update. In my opinion, it will never supplant the old classic, and it shouldn't because it is designed to do other things. The program consists of 6 modules, Word Processing, Spreadsheet, Database, Paint, Communication, Page Layout, and all sorts of new tools. This is a lot of stuff to have in one program and all integrated. Let's take them up one at a time. But before we do that, one word about the print drives. The program only supports the Image Writer and Laser printers. They do (maybe) support an Epsom printer in a sort of generic way and they do not even indicate which model works the best. Obviously, they are going to have to supply some more drivers. Don't forget APPLEWORKS GS is color oriented and it has to have a color printer if you are going to get the most out of it.

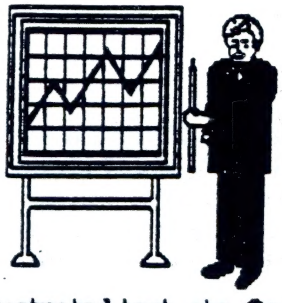


Overall , this program is Mouse driven and full of Dialog Boxes. The Word Processor, Communication and Page Layout modules will import text files from AppleWorks, APPLEWORKS GS, Multiscribe GS,and ASCII. All modules, except the Spreadsheet, will inport the following graphic formats: APPLEWORKS GS, Apple Preferred Format (APF), Paint (PNT),PICT, Screen (320 and 640). This compatibility with ASCII text files and the various graphic formats should enable the user to get his data from a large variety of sources.

The Word Processor is, as you probably know, an update of Multiscribe GS. If you

know Multiscribe you know all there is to know about this word processor. For those who don't, let me say it is an elegant word processor which comes with a number of installed fonts ranging in size from 4 to 48 which can be enhanced by making them BOLD, ITALIC, SHADOW, UNDERLINE, etc..

This word processor has the ability to print each letter, word, paragraph in different colors, fonts. sizes etc. In addition it can import graphics. This makes this word processor outstanding for preparing display pages, illustrated text, etc. One very good use is to prepare large type documents for the visually impaired as our Dr. Bill Anderson demonstrated to us last year.



The Database and Spreadsheet modules are much more powerful than before, and of course they are color oriented (you can print negative numbers in red). They rely heavily on the Mouse, and Dialog Boxes. The Database supports 69 functions and the Spreadsheet supports 73. These formulae cover the whole range of functions including; Arithmetic; Trigonometic; Financial; String; Conversion; and Special Purpose. Just to describe these functions would be a book in itself.

Basically, both and Database and the Spreadsheet work in the normal fashion but you have to learn many new commands. Of course they can be incorporated into your Page Layout module.

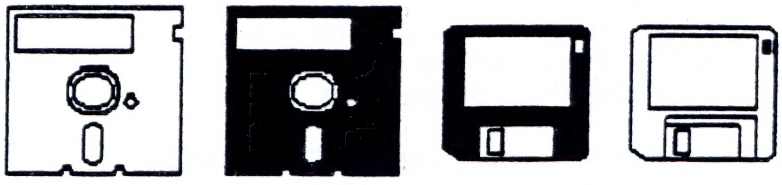
The Communication Module is probably the weakest of all. It is simple enough to use and installs easily, but it does not support Macros so you can not automatically log on, enter passwords etc. It does support XMODEM, YMODEM AND BINARY II so you can transfer programs as well as text files.

The GRAPHIC MODULE is a standard type APPLE paint program. Actually, I have not had time to really work with it. However, when I tried to import graphics I had made with another pain program, the colors were wrong and I could not change them.

Finally, we get to the Page Layout Module, where you import all the data you generated from the aforementioned modules into your finished document. You now have the tools to print out a multipage "Report to Stockholders" type of report in color.

I have tried to explain what APPPLEWORKS GS is all about. It is a BIG PROGRAM. It is COMPLICATED. It has BUGS. It has the capability of LOCKING UP with no warning, so constantly save to disk as you go along. But if you need to publish that "Report to Stockholders" in COLOR, this is the only program for an Apple IIgs that will do it.

Good Luck - Jim Blech



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9	10	11	12	13	14	15
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